Alan Shefman 965-8837

René Daudet

May 9, 1990

965-0519
0519
0520

MEMORANDUM

MEMO TO: Tanja Wacyk
Director, Policy & Research

FROM: Bruce Drewett
Policy Analyst

RE: Environmental Hypersensitivity

In virtually every physical setting - in homes, schools, work environments, and public places - whether built or natural - there are major health issues that need to be addressed.

The following is a brief synopsis of the major conclusions drawn from a review of the literature on environmental hypersensitivity, also known as "20th Century Disease", "Total Allergy Syndrome", and "Ecological Illness".

The Ad Hoc Committee on Environmental Hypersensitivity, in its 1985 report to Ontario's Minister of Health, defined environmental hypersensitivity in the following terms:

> Environmental hypersensitivity is a chronic (i.e. continuing for more than three months) multisystem disorder, usually involving symptoms of the central nervous system. Affected persons are frequently intolerant to some foods and they react adversely to some chemicals and to environmental agents, singly or in combination, at levels generally tolerated by the majority. Affected persons have varying degrees of morbidity, from mild discomfort to total disability. Upon physical examination, the patient is normally free from any abnormal objective findings. Although abnormalities of complement and lymphocytes have been reported, no single laboratory test, including serum IgE is consistently altered. Improvement is associated with avoidance of suspected agents and symptoms recur with re-exposure.[1]

M.R. Cullen, who uses the term "multiple chemical sensitivities", has proposed the following definition:

> ...an acquired disorder characterized by recurrent symptoms, referable to multiple organ systems, occurring in response to demonstrable exposure to many chemically unrelated compounds at doses far below those established in the general population to cause harmful effects. No single widely accepted test of physiologic function can be shown to correlate with symptoms.[2]

The journal Clinical Ecology, published by the American College of Physicians, provides the following definition:

> Ecologic illness is a polysymptomatic, multisystem chronic disorder manifested by adverse reactions to environmental excitants as they are modified by individual susceptibility in terms of specific adaptations. The excitants are present in air, water, drugs and our habitats.[3]

The practice of clinical ecology centres on the diagnosis and treatment of environmental illness on the basis of two concepts: that a broad range of environmental chemicals and foods can be responsible for an illness in which an unlimited variety of symptoms occur in the absence of objective physical findings and abnormal laboratory test results; and that the immune system is functionally depressed by many environmental chemicals.

The environmental agents alleged to cause illness and provoke symptoms are numerous. They include: petrochemicals, synthetic hydrocarbons, pesticides, herbicides, detergents, perfumes, vehicle exhaust fumes, chlorine, fluoride, natural gas, combustion products, dental amalgam, food additives, drugs, endogenous hormones, electromagnetic radiation and Candida albicans, a yeast normally found in the gastrointestinal tract that depresses the immune system causing an illness with multiple, subjective symptoms such as headaches, digestive disorders and rashes.

Proof of cause - effect relations between environmental factors and symptoms of "environmental illness" is particularly difficult because of the implication of such a broad range of agents. However, food and chemical sensitivities as causes of chronic pain, fatigue, depression, functional and behaviourial disorders, and cardio-respiratory illness have been acknowledged by many clinical ecologists and a small but growing number of traditionally-oriented physicians.

The principle method of proof of environmental hypersensitivity is the symptom-provocation test used in individual cases after the condition is suspected because of a history of symptoms and suspected causes. More specifically, the term "total body

overload" is used to postulate the theory that a patient's symptoms signify that the system's capacity for simulating an immune response has been exceeded. "Masked food sensitivity" is a term used to explain why a patient may react adversely to a food when first eaten after several days avoidance. "Spreading phenomenon" refers to the concept that exposure to one environmental substance leads to the induction of immune responses to other unrelated substances and is used to explain a patient's subjective report of increasing symptoms.

Caution should be exercised, however, in analyzing the actual results derived from such testing. Many of the tests have employed widely different subject-selection methods and outcome measurement criteria. As such, the tests have been considered flawed due to the absence of matched patient-control groups, the absence or inadequacy of the placebo (a medication prescribed more for mental relief of the patient than for it s actual effect on the disorder), and the failure to achieve or document randomness of trials.

Without the presence of medical evidence, the Ontario Medical Association has not yet been willing to accept environmental hypersensitivity as an official diagnostic classification. Instead, many doctors continue to hold the view that patients who claim to be suffering from the effects of environmental hypersensitivity are, in fact, experiencing the effects caused by psychological disorders or clinical depression. Environmental hypersensitivity advocates do not dispute that some members of their group may be suffering from some type of psychological disturbance. However, they argue that such disturbance is a by-product of their long attempt to seek treatment, which has been characterized by inaccurate diagnosis, family break-up, ruined reputation and increased disability.

It is now four and a half years since the Ad Hoc Committee on Environmental Hypersensitivity Disorders, chaired by former Judge and current Deputy Minister of Labour, George Thompson, released its report to the then Minister of Health, Murray Elston. That report contained many recommendations focusing on the need for greater research into the prevalence of environmental hypersensitivity, the diagnostic testing procedures associated with the identification of the illness and the need for research to be carried out in a multi-disciplinary investigative and therapeutic manner by the Ministry of Health.

Although the current Minister of Health, Elinor Caplan, has provided some $600,000 for further research into sensitivities caused by food and chemical sensitivities, little has been done on a substantive basis to address a number of remaining concerns of the Committee. For example, diagnostic testing for environmental hypersensitivity is still not included in the OMA fee schedule. Also, OHIP officials remain inconsistent when deciding whether to reimburse patients for any or all medical expenses incurred for

out-of-country diagnosis of and treatment for environmental hypersensitivity.

On the other hand, the Ministry of Community and Social Services appears to be showing a few more signs of progress on this issue. The Director of the Income Maintenance Branch, Bob Cooke, has recently instructed members of the Ministry's Medical Advisory Board and all case workers to be careful in assessing an individual client's ability to work or engage in activities of daily living regardless of the specific diagnostic classifications labelling their illness. Such a directive is important because it may provide a signal that the Ministry is preparing to move away from the current definition of disability which is used to determine eligibility for Family Benefits and Vocational Rehabilitation Assistance. That definition relies solely on medical findings as to whether a person has a prolonged and severe disability resulting in permanent unemployability.

It is believed the new definition that will be used to define disability will be similar to that developed by the World Health Organization (WHO). Adoption of the WHO definition of disability would replace the current criteria of permanence, medical nature, and severity with a system that would define eligibility in terms of temporary or permanent losses, abnormalities (impairments), inability to perform activities (disabilities), and inability to perform roles (handicaps). In other words, the fact that someone has an inability to walk (a disability) would not necessarily mean that that person has a handicap (i.e. inability to perform the duties of a job). Such a system of classification would allow for an assessment of the way in which non-medical factors help determine whether a person is functionally handicapped in a given circumstance.

A proper interpretation and application of these definitions could have the effect of bringing many more persons with environmental hypersensitivities into eligibility for social assistance, including direct financial aid and major supplementary assistance for many of the costs associated with environmental hypersensitivity, including: rotary organic diets, vitamin supplements, amino acid treatments, allergy testing, acupuncture treatments and air purification devices (for which the federal government is now permitting a tax deduction if medical certification is provided). In all, these costs have been estimated to range from $800 - $1000/month, which, of course, often presents a financial hardship for persons with an environmental hypersensitivity who are unable to work and are not eligible to receive social assistance.